

Work Order ID 54857

December 31, 2009 11:00:13 AM



Ship wedn. 6 jan 10

Page 1

Item ID: D205-770-011

Accept



Setup Start



Revision ID:

Stop



Item Name: Replacement Engine Mount

Start Date: 1/4/2010 Start Qty: 1.00



Cust Item ID:

Required Date: 1/6/2010 Req'd Qty: 1.00



Customer:

Reference:

Approvals: Process Plan: WPF Date: 09-12-31 Tooling: _____

Date: _____

Run Start



QC: _____ Date: _____ SPC (Y/N): _____

Date: _____

Stop



Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Draw Number	Draw Rev.	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
--------------------------------	--------------------------	----------------------	----------------	--------------	--------------	---------------	---------------	------------------	----------------

Draw Nbr

Revision Nbr

IIN D205-770

Rev B

100

0.00



DOCUMENT CONTROL

DC

Memo

0.00

Document Control

Photocopy bluefile and create labels per PPP D205-770-011 CHG

002

GCN 09-16-04

S106105

110

0.00



Pick Kit

Packaging

Memo

0.00

Packaging

P106105

120

0.00



QC4- 100% Inspect kits for completeness

QC


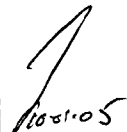

Memo

0.00

Quality Control

S106105



W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
10/01/05	# 100	up Date chg # to chg 602. see Attached Ecn		10/01/05		 10/01/05	 10/01/05

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Work Order ID 54857

December 31, 2009 11:00:13 AM

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Item ID: D205-770-011

Accept

Setup Start

Revision ID:

Stop

Item Name: Replacement Engine Mount

Start Date: 1/4/2010 Start Qty: 1.00

Cust Item ID:

Required Date: 1/6/2010 Req'd Qty: 1.00

Customer:



Reference:

Approvals: Process Plan: _____ Date: _____ Tooling: _____ Date: _____

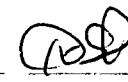
Run Start

QC: _____ Date: _____ SPC (Y/N): _____ Date: _____

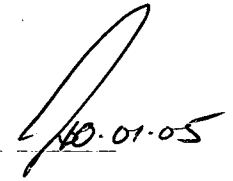
Stop

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Draw Number	Draw Rev.	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
130		0.00							
	Packaging								
Packaging	Memo	0.00							
Packaging	Identify and pack for shipping as per PPP D205-770-011 CHG001								
	Location: <u>42</u>								
	PPP Rev: <u>05</u>								
140									
	QC21- Final Inspection - Work Order Release	0.00							
QC	Memo	0.00							
Quality Control									

10-1-5



1



MF

10-01-05

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Picklist Print

December 31, 2009 11:00:12 AM

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Work Order ID: 54857

Parent Item: D205-770-011

Parent Item Name: Replacement Engine Mount

Comments:

Start Date: 1/4/2010

Required Date: 1/6/2010

Start Qty: 1.00

Required Qty: 1.00

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Remaining Qty To Pick	Qty Issued	Date Issued	Status
D3684-043 MOUNT ASSEMBLY		Manufactured	No			110	Each	1.0000	1.0000			

Warehouse
Location

Loc Qty

Loc Code

Main Warehouse

ST

1

52470

1

110

Each

7.0000

1.0000

52470

1/10/01/4 (1)

Warehouse
Location

Loc Qty

Loc Code

Main Warehouse

ST

5

50740

5

Main Warehouse

ST139A

2

51152

1

52469

1

50740

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Picklist Print

December 31, 2009 11:00:12 AM

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Work Order ID: 54857



Parent Item: D205-770-011



Parent Item Name: Replacement Engine Mount

Start Date: 1/4/2010

Required Date: 1/6/2010

Comments:

Start Qty: 1.00

Required Qty: 1.00

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Remaining Qty To Pick	Qty Issued	Date Issued	Status
D3692-1 SPACER		Manufactured	No			110	Each	654.0000	4.0000			

Warehouse
Location

Loc Qty

Loc Code

Main Warehouse

ST

59

44827

8

45672

14

50325

37

Main Warehouse

ST127

595

50736

187

51467

408

50736

AN3C12A

Purchased

No

110

Each

356.0000

4.0000

Bolts

Warehouse

Loc Qty

Loc Code

Location

Main Warehouse

ST

356

112314

356

112314

December 31, 2009 11:00:12 AM

Shop Packet Print

Page 2

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Picklist Print

December 31, 2009 11:00:12 AM

Page 3

Work Order ID: 54857

Parent Item: D205-770-011

Parent Item Name: Replacement Engine Mount


Comments:

Start Date: 1/4/2010

Required Date: 1/6/2010

Start Qty: 1.00

Required Qty: 1.00

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Remaining Qty To Pick	Qty Issued	Date Issued	Status
MS21043-3  Nut		Purchased	No			110	Each	4,548.000	2.0000			

<u>Warehouse</u>	<u>Loc Qty</u>	<u>Loc Code</u>
<u>Location</u>		
OFFSHORE		
FG	80	
103691	80	
Main Warehouse		
ST	4468	
111819	70	
112243	29	
112314	4369	

D3685-041



BIPOD MOUNT ASSEMBLY

D3686-041



MONOPOD ASSEMBLY

Manufactured No

110 Each

0.0000

1.0000

Manufactured No

110 Each

2.0000

1.0000

<u>Warehouse</u>	<u>Loc Qty</u>	<u>Loc Code</u>
<u>Location</u>		
Main Warehouse		
ST	2	
51156	2	

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Shop Packet Print

Page 3

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
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			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Work Order ID 54857

December 31, 2009 11:00:13 AM

Item ID: D205-770-011

Revision ID:

Item Name: Replacement Engine Mount

Start Date: 1/4/2010 Start Qty: 1.00

Required Date: 1/6/2010 Req'd Qty: 1.00

Reference:

Approvals: Process Plan:

QC:

Date:

Date:

Tooling:

SPC (Y/N):

Date:




Date:

Setup Start

Stop

Run Start

Stop

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Draw Number	Draw Rev.	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
Draw Nbr	Revision Nbr								
IIN D205-770	Rev B								
100		0.00							
	DOCUMENT CONTROL								
DC	Memo	0.00							
Document Control	Photocopy bluefile and create labels per PPP D205-770-011 CHG001								
110	Pick Kit	0.00							
									
Packaging	Memo	0.00							
Packaging									
120	QC4- 100% Inspect kits for completeness	0.00							
									
QC	Memo	0.00							
Quality Control									

BT 10-1-09

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

4. WEIGHT AND BALANCE

The following is the net weight increase associated with the D205-770-011 Kit.

Installation	Weight	LATERAL		LONGITUDINAL	
		Arm	Moment	Arm	Moment
D205-770-011	14.6 lb	-3.5 in	-51.1 in-lb	107.8 in	1574 in-lb
Replacement Engine Mount Kit	6.62 kg	-0.09 m	-0.6 m-kg	2.74 m	18.1 m-kg

5. PARTS LIST

Qty -011	Part Number	Description
X	D205-770-011	REPLACEMENT ENGINE MOUNT KIT
1	D3684-041	TRIPOD MOUNT ASSEMBLY
1	*D3684-043	MOUNT ASSEMBLY
8	**D3692-1	SPACER
4	**AN3C-12A	BOLT
4	**MS21043-3	NUT
1	**D3687-1	MOUNT
1	**D3684-047	FWD LEG ASSEMBLY
1	***D3688-1	STUD
1	***D3689-1	SLEEVE
1	***D3691-1	STUD
4	***D3692-1	SPACER
1	***D3693-1	ROD END BEARING
2	***AN3C-12A	BOLT
2	***MS21043-3	NUT
1	***NAS509-12C	NUT
1	***NAS509L-12C	NUT
1	**D3684-049	AFT LEG ASSEMBLY
1	***D3688-3	STUD
1	***D3689-1	SLEEVE
1	***D3691-1	STUD
4	***D3692-1	SPACER
1	***D3693-1	ROD END BEARING
2	***AN3C-12A	BOLT
2	***MS21043-3	NUT
1	***NAS509-12C	NUT
1	***NAS509L-12C	NUT
1	*D3684-045	INBOARD LEG ASSEMBLY
1	**D3688-5	STUD
1	**D3689-1	SLEEVE
1	**D3691-1	STUD
4	**D3692-1	SPACER
1	**D3693-1	ROD END BEARING
2	**AN3C-12A	BOLT
2	**MS21043-3	NUT
1	**NAS509-12C	NUT
1	**NAS509L-12C	NUT
4	*D3692-1	SPACER
2	*AN3C-12A	BOLT
2	*MS21043-3	NUT

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Revision: B

Date: 08.12.15

1	D3685-041	BIPOD MOUNT ASSEMBLY
1	*D3687-3	MOUNT
1	*D3684-047	FWD LEG ASSEMBLY
1	**D3688-1	STUD
1	**D3689-1	SLEEVE
1	**D3691-1	STUD
4	**D3692-1	SPACER
1	**D3693-1	ROD END BEARING
2	**AN3C-12A	BOLT
2	**MS21043-3	NUT
1	**NAS509-12C	NUT
1	**NAS509L-12C	NUT
1	*D3684-049	AFT LEG ASSEMBLY
1	**D3688-3	STUD
1	**D3689-1	SLEEVE
1	**D3691-1	STUD
4	**D3692-1	SPACER
1	**D3693-1	ROD END BEARING
2	**AN3C-12A	BOLT
2	**MS21043-3	NUT
1	**NAS509-12C	NUT
1	**NAS509L-12C	NUT
8	*D3692-1	SPACER
4	*AN3C-12A	BOLT
4	*MS21043-3	NUT
1	D3686-041	MONOPOD ASSEMBLY
1	*D3688-7	STUD
1	*D3689-1	SLEEVE
1	*D3691-1	STUD
4	*D3692-1	SPACER
4	*D3692-3	SPACER
1	*D3693-1	ROD END BEARING
1	*D3693-3	ROD END BEARING
2	*AN3C-10A	BOLT
2	*AN3C-12A	BOLT
4	*MS21043-3	NUT
1	*NAS509-12C	NUT
1	*NAS509L-12C	NUT

(NOTE: PARTS IN BOLD TYPE CONSTITUTE PICK LIST FOR D205-770-011 KIT)

* PART IS INCLUDED WITH ASSEMBLY ABOVE

** PART IS INCLUDED WITH ASSEMBLY ABOVE

*** PART IS INCLUDED WITH ASSEMBLY ABOVE

ENGINEERING CHANGE NOTICE
DART AEROSPACE LTD

Date: 09.09.09	Job No.: ENG0108AGU	ADR Yes/No: Y	ADR Date: 09.08.26	ECN #: 09- 664
Product No.: D205-770		Created By: RF	Approved By: RF	
Product Name: Replacement Engine Mount Kit		Checked By: RF	General Manager Approval:	

Distribution	Reqd	Resp	Initial / Date
Production Manager	Y	LL/JLM	LL 09.09.22
Production Engineering Coord	Y	EC/DD	EC 09/09/22
Production Document Control	N		
Customer Technical Support	N		

Distribution	Reqd	Resp	Initial / Date
DQA / QA Coord	N		
QC Coordinator	N		
Marketing	N		
Customer Order Processing	N		

Reason for Change: Correct problem with D3687 per NCR09-084. Improvement for machining on D3688 & D3691

Documents Affected:

Release of the following documents:

MDL-D205-770 Rev. D

D3687 Rev. C

D3688 Rev. C

D3691 Rev. C

REFERENCE ONLY

PARTS MUST COMPLY

☐

PREVIOUS PARTS SATISFACTORY

☒

#	Quality Assurance Actions	Reqd	Resp	Notes	Complete
1	Notify Previous Customers	N			
2	Notify Eurocopter France	N			
3					

#	Engineering Actions	Reqd	Resp	Notes	Complete
4	Required Documents/Drawings Under Review	N			
5	Update Product Compatability Matrix	N			
6	Create Eurocopter Form (FEE)	N			
7	Notify TC / FAA of Change	N			

#	Document Control Actions	Reqd	Resp	Notes	Complete
8	Move Electronic Files	Y	KJ		09.09.22 RF
9	Update Blue/Pink/DSI Folder and Electronic Files	N			
10	Update Controlled PDF Files	Y	KJ		09.09.22 RF
11	Update Master Document List (MDL)	Y	RF	MDL-D205-770 Rev. D	15.09.22 RF 09.09.22
12	Update Document Record (DR)	Y	KJ	Rev. C	09.09.22 RF
13	Update Product Development Summary	N			
14	Update QSI 021 and/or STC Approval List	N			
15	Update Parts / STC Database	N			
16	Update / Verify ARC Database	N	RF		
17	Create / Update Change Record Form	Y	KJ	D205-770-011 now at CHG 002 1	09.09.22 RF
18	Create / Update PPP's	Y	KJ		09.09.22 RF
19	Update Document Control Database / Laminated Dwgs	N	RF		
20	Update Grey Project Binder	Y	KJ		09.09.22 RF
21	Update D-Part/M-Drawing/DSI/DEO Master Binders	Y	KJ		09.09.22 RF
22					
23					

Description / Action:

Send D3687 Rev. C drawing to vendor to update CNC program for D3687-1/-3. Existing Stock has been fixed per D. Shepherd instructions (see ADR dated 09.08.26)
Update internal CNC program per D3688 and D3691 Rev. C. Existing stock done with previous revision are ok.

ECN Verified & Complete: 

Date: 09/09/23

ENGINEERING CHANGE NOTICE
DART AEROSPACE LTD

Date: 09.09.09	Job No.: ENG0108AGU	ADR Yes/No: Y	ADR Date: 09.08.26	ECN #: 09- 664
Product No.: D205-770		Created By: RF	Approved By: RF	
Product Name: Replacement Engine Mount Kit		Checked By: RF	General Manager Approval:	

Distribution	Reqd	Resp	Initial / Date
Production Manager	Y	LL/JLM	
Production Engineering Coord	Y	EC/DD	
Production Document Control	N		
Customer Technical Support	N		

Distribution	Reqd	Resp	Initial / Date
DQA / QA Coord	N		
QC Coordinator	N		
Marketing	N		
Customer Order Processing	N		

Reason for Change: Correct problem with D3687 per NCR09-084. Improvement for machining on D3688 & D3691

Documents Affected:
Release of the following documents:
MDL-D205-770 Rev. D
D3687 Rev. C
D3688 Rev. C
D3691 Rev. C

REFERENCE ONLY

PARTS MUST COMPLY ☐ **PREVIOUS PARTS SATISFACTORY** ☒

#	Quality Assurance Actions	Reqd	Resp	Notes	Complete
1	Notify Previous Customers	N			
2	Notify Eurocopter France	N			
3					

#	Engineering Actions	Reqd	Resp	Notes	Complete
4	Required Documents/Drawings Under Review	N			
5	Update Product Compatability Matrix	N			
6	Create Eurocopter Form (FEE)	N			
7	Notify TC / FAA of Change	N			

#	Document Control Actions	Reqd	Resp	Notes	Complete
8	Move Electronic Files	Y	KJ		09.09.22 RF
9	Update Blue/Pink/DSI Folder and Electronic Files	N			
10	Update Controlled PDF Files	Y	KJ		09.09.22 RF
11	Update Master Document List (MDL)	Y	RF	MDL-D205-770 Rev. D	09.09.22 RF
12	Update Document Record (DR)	Y	KJ	Rev. C	09.09.22 RF
13	Update Product Development Summary	N			
14	Update QSI 021 and/or STC Approval List	N			
15	Update Parts / STC Database	N			
16	Update / Verify ARC Database	N	KJ		
17	Create / Update Change Record Form	Y	KJ	D205-770-011 now at CHG 002-1	09.09.22 RF
18	Create / Update PPP's	Y	KJ		09.09.22 RF
19	Update Document Control Database / Laminated Dwgs	N	KJ		
20	Update Grey Project Binder	Y	KJ		09.09.22 RF
21	Update D-Part/M-Drawing/DSI/DEO Master Binders	Y	KJ		09.09.22 RF
22					
23					

Description / Action:
Send D3687 Rev. C drawing to vendor to update CNC program for D3687-1/-3. Existing Stock has been fixed per D. Shepherd instructions (see ADR dated 09.08.26)
Update internal CNC program per D3688 and D3691 Rev. C. Existing stock done with previous revision are ok.

N/A
a 09.09.22

ECN Verified & Complete: _____ Date: _____